Q.) Can the proposed spillway for the upper lake will be moved to the South side of the damn, not the North side of the dam as illustrated in the current drawings

A.) As requested by residents of Fox Trace Lane, the City's consultant has evaluated the spillway alignment for the upper lake dam at both the north side and south side of the dam. The spillway has now been located to the south side of the dam.

Q.) Can the spillway on south side of upper lake dam be evaluated to avoid removing trees behind the homes?

A.) The trees that exist between the existing walking paths and private property are not being disturbed. The spillway size will be reduced as much as possible, to save trees, and remain compliant with Ohio Department of Natural Resources (ODNR) design requirements.

Q.) Can the trees/shrubs — behind Fox Trace Lane resident homes — that are on the north bank of the upper lake, from the dam to the eastern bridge crossing the creek, NOT be disturbed, altered, replaced or removed?

A.) As requested by the residents of Fox Trace Lane, the City has evaluated eliminating storm water storage along the north bank of the upper lake, thereby saving these existing trees and vegetation. The results of limiting the grading for the project have reduced the additional storm storage volume from 9.5 acre-feet to 7.3 acre-feet. For reference, one (1) acre-foot will cover a football field with about one foot of water.

Q.) Will the tree buffer remain along the properties on Ravenna Street that back up to the earthen dam area?

A.) Yes. Trees between the existing walking paths and private property along Ravenna Street will remain.

Q.) Can the willow tree be saved along the south bank?

A.) Tree removal limits will be further evaluated as the design continues, but it is likely that trees currently located at the bottom of the grass hill, along the south side of the upper pond, will be eliminated in order to provide additonal storm water capacity.

Q.) Can the landscaping plan be added too?

A.) Yes. A replacement tree and brush planting plan will be implemented as the project design continues.

Q.) If the contractor is making changes to both lakes can we get both lakes "mucked out", i.e. clean out silt and dirt to make them deeperand increase water storage?

A.) The inclusion of removal of sediment from the bottom of the ponds is still in review and included as budget allows.

Q.) What impact or changes will be made to the wetland area composing the eastern end of the upper lake?

A.) The City's design consultant has performed a preliminary wetland/stream delineation of the project area and is currently classifying the type and health of wetlands and streams. Their footprint within the potential project is not yet known. The City's goal is to avoid wetlands and streams where possible.

Q.) Will the cattails and reeds surrounding the upper lake be disturbed, altered, replaced or removed? If so, can details of the types of plants and vegetation that will be used to replace them be provided?

A.) The consultant has collected preliminary stream and wetland information for the project but has yet to identify their type and health or plant species. The intent of this project is for the City to meet ODNR Dam compliance & introduce additional flood storage. If invasive species are found, such as canary reed & narrow leaf/hybrid cattails, the project will try to remove them and plant with native plants, as part of the project, as the budget allows.

Q.) Can a detail on the specific areas of the upper and lower lakes that will be modified to increase storm water retention be provided?

A.) An exhibit showing the proposed dam work, including emergency spillway configuration and grading at the upper lake, has been placed on the project website. As more detailed drawings become available, they will be uploaded to the project website.

Q.) Can a detail on the changes that will be made to both dams be provided?

A.) An exhibit showing the proposed dam work, including emergency spillway configuration and grading at the upper lake, has been placed on the project website. As more detailed drawings become available, they will be uploaded to the project website.

Q.) Will the bridges be repaired and/or replaced with this work? Requested that bridges be reviewed, repaired and replaced.

A.) The City of Hudson Public Works staff will be reparing the bridges later this year. Replacement bridges will be included in the upcoming budgets.

Q.) How will the pond elevations and aesthetics be maintained? Concerned with mosquitos.

A.) The permanent lake elevations will remain. The box culvert outlet at the upper lake pond is not being modified. At the lower lake, the new earth dam and spillway will be designed so that the permanent pool elevation does not change. See question and anwer below regarding mosquitos on-site.

Q.) How is mosquito control being addressed?

Improvements to allevaite the opportunity for mosquito larvae to develop will be evaluated as the project design continues. The Summit Soil & Water Convervation District (SSCWD) and Summit County Board of Health (SCBH) have been contacted about this concern and noted that pools of standing water, with little movement are the best breeding conditions for mosquitos. They also noted that mosquitos do not like direct sunlight" and that preventing the hybrid/narrow leaf cattails and willows from sprouting will reduce the mosquito population. Often, cattails die off and create mats where the larvae can hide.

The project will review the elimination of invasive species of cattails and other mosquito friendly habitat. Where vegetation is removed, the introduction of native plantings will be utilized. Also, pond dredging, to increase the overall water depth, will be also be evaluated.

Q.) Will the trail off of Ravenna Street be changed? If so, what are the changes?

A.) The access trail from the ponds to Ravenna Street will be utlized during construction. After contruction, the trail will be replaced in-kind.

Q.) What are the grading impacts along the upper lake and "sled riding hill area", as well as the area behind properties along Fox Trace Lane?

A.) The grant funds received from NEORSD are contingent upon addressing the ODNR dam requirements and increasing storm water storage in the upper lake. As the project design continues, the re-introductin of areas for "sled riding" will be incorporated along with meeting the overall project requirements.

Q.) Will there be a safety bench along the upder lake?

A.) Any grading at the lake's edges will incorporate a safety bench, or a low slope area that is designed to prevent someone from falling into deep water, if they fall near the edge of the pond.

Q.) Will the trails remain open during construction and will the trail be maintained along the south edge of the lower lake?

A.) In order to maintain a safe construction zone, temporary closure of sections of the trail system around the ponds will be required during construction. The final construction sequencing, and temporary trail closures, are still being evaluated.

Q.) Will the City maintain the ponds to keep vegetation down?

A.) Measures to alleviate vegetation within the ponds are being evalauted as part of the project. After construction, future maintenance practices, including temporary lowering of the pond elevations for maintence, will be incorporated to reduce vegetation from growing within the pond footprints.

Q.) Were there changes in regulations from when work was done several years ago?

A.) Yes. The State of Ohio has always taken a proactive approach to changing the Ohio Revised Code to improve safety for its residents. That includes matching federal laws related to dams and rain regulations. Most recently, the Probable Maximum Flood calculations were updated with new rainfall information (2017-18). The classification of a dam can also be changed over time based upon the development downstream of the dam.

Q.) What was the depth of the lake back in 2011 after the improvement and how much soil was removed?

A.) Approximatley 8,000 - 8,600 cubic yards of material was dreged from the upper lake in 2011. After construction, the deepest part of the upper pond was approximately eight to nine feet deep.

Q.) What is the depth of each lake right now and in the proposed condition?

A.) The upper lake is mostly flat in the middle with a depth of about 6.7 feet. The lower lake varies from 3.5 feet deep to 5.3 feet deep outside the main channel. The City's design consultant is currently performing sediment depth analysis to determine the proposed conditions. The intention is to provide a healthy water system at an affordable cost within the parameters of the regulations and NEORSD grant.

Q.) What is the estimate of increased maintenance cost for the larger size of the lake?

A.) The anticipated annual maintenance cost will be equal, or slightly less as there will be less area for mowing.

Q.) Why is there grass in the lower pond?

A.) Late this summer, the lower lake was lowered for maintenance. While the lake water elevation was low, seeds embeded in the existing soil, that is typically under water, were able to germinate and grow to the condition that is present today. Typically, the permanent pool of water and colder temperatures prevent this vegetation from growing.

Q.) Is retention being looked at in other areas of Hudson?

A.) The Brandywine Creek Watershed Study that was conducted as part of a larger, Cuyahoga River South Watershed Study, identified a number of oppurtunities for storm water storage in the Brandywine Creek watershed. The grading in the upper lake pond as part of this project is one of the first locations where additional storm water storage, and other identified storm water improvvements, are being implemented.